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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/644,923	08/23/2000	Darryl Scott Burkett	RIV6172P	1854
7590 04/09/2004			- EXAMINER	
The Law Office of Randall T. Erickson, P.C.			BRAHAN, THOMAS J	
425 W. Wesley St. Suite 1			ART UNIT	PAPER NUMBER
Wheaton, IL 60187			3652	
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Please find below and/or attached an Office communication concerning this application or proceeding.

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	Application No.	Applicant(s)				
	09/644,923	BURKETT, DARRYL SCOTT				
Office Action Summary	Examiner	Art Unit				
	Thomas J. Brahan	3652				
The MAILING DATE of this communication app Period for Reply	pears on the cover sheet with the c	orrespondence address				
A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.1: after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period - Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	36(a). In no event, however, may a reply be time within the statutory minimum of thirty (30) days will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 21 N	ovember 2003.					
	action is non-final.					
3) Since this application is in condition for allowar	nce except for formal matters, pro	secution as to the merits is				
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims						
4) ☐ Claim(s) 1-21,24 and 26-35 is/are pending in the 4a) Of the above claim(s) is/are withdraw 5) ☐ Claim(s) is/are allowed.  6) ☐ Claim(s) 1-21,24 and 26-35 is/are rejected.  7) ☐ Claim(s) is/are objected to.  8) ☐ Claim(s) are subject to restriction and/or	wn from consideration.					
Application Papers						
9) The specification is objected to by the Examiner.						
10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.						
Applicant may not request that any objection to the	drawing(s) be held in abeyance. See	e 37 CFR 1.85(a).				
Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Ex		• •				
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of:  1. Certified copies of the priority document: 2. Certified copies of the priority document: 3. Copies of the certified copies of the priority document: application from the International Bureau * See the attached detailed Office action for a list	s have been received. s have been received in Application rity documents have been receive u (PCT Rule 17.2(a)).	on No ed in this National Stage				
Attachment(s)						
1) Notice of References Cited (PTO-892)	4) Interview Summary					
2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date	Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	ate atent Application (PTO-152)				

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The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 1-16, 27-32 and 35 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claims contain subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor, at the time the application was filed, had possession of the claimed invention. There is no basis in the disclosure for reciting that the crane post is vertically aligned with the axle or the axis of rotation of the wheels. This is new matter as this language is not found in the specification. The drawing figures are inconsistent with respect to this feature and cannot be relied upon as a basis for this new claim language. Note that drawing figure 2 is a side showing of the crane arrangement, and it has the post behind the axis of the wheels.

The following is a quotation of the second paragraph of 35 U.S.C. § 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which applicant regards as his invention

Claims 1-19 and 27-32 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

- a. In claim 1, lines 8 and 9, the limitation "said central location being centrally located both longitudinally and laterally" is incomplete. It does not specify with respect to which element the location is located longitudinally and laterally. Claim 11, at lines 8 and 9, claim 17, also at lines 8 and 9, have the same incomplete limitation.
- b. In claim 11, lines 6 and 7, the term "said post" lacks antecedent basis within the claims. Note that line 6 recites that the crane arm is extendable from a post, but it does not state that the crane includes this post.
- c. Claim 14 at lines 5 and 6 appears to repeat the limitation of lines 3 and 4 which has the hydraulic crane power unit mounted in front of the post.
- d. In claim 27, lines 5 and 6, the limitation "said trailer supported on only at least one pair of road wheels" is not understood. How is the applicant using the term "only" along with the term "at least one"? These terms appear to contradict each other.
- e. In claim 16, line 3, the term "said crane" lacks antecedent basis within the claims. The claims provide a basis for a crane arm, and a crane power unit, but not for a crane.
- f. Claim 32, at lines 12 and 13, appears to repeat the limitation of lines 9 and 10 which has the hydraulic crane power unit mounted in front of the post.

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The following is a quotation of the appropriate paragraphs of 35 U.S.C. § 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

The following is a quotation of 35 U.S.C. § 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claim 11, as best understood, is rejected under 35 U.S.C. § 102(b) as being anticipated by Larva et al. Larva et al shows a trailer-mounted crane comprising:

a compact trailer (note the term "compact" is relative) having a frame supported from a ground surface on at least two wheels (18) having a common axis of rotation, the trailer having a substantially rectangular trailer platform (15) carried by the frame;

a hydraulically operated crane arm (35) extendable from a post (250), the post mounted on the trailer at a fixed position to extend upwardly from a central location of the trailer platform, the central location substantially centrally located both longitudinally and laterally (note that the central axis of the post is not centered longitudinally and laterally on the platform, but a sidewall of the post is located over the central location, as to read on the limitation), the post mounted to the trailer at a position substantially vertically aligned with the common axis of rotation of the wheels (to the same degree that applicant's wheels are aligned with the post);

a hydraulic power unit (100) mounted to trailer for supplying pressurized hydraulic fluid to the crane arm;

a control panel (132) carrying controls for the hydraulic power unit, the control panel mounted on the trailer independent of movement of the post; and

an operator seat (230) supported from the trailer independent of movement of the post and arranged to face the control panel.

Claims 17 and 27, as best understood, are rejected under 35 U.S.C. § 102(b) as being anticipated by McIntosh et al. McIntosh et al shows a mobile crane apparatus comprising:

a trailer having a frame (2, 2) that mounts a single axle (3), the frame supported by at least on pair of road transportation wheels mounted on the axle, the trailer having a substantially rectangular platform (the subframe shown in figure 3) supported by the frame, the frame having a hitch attachment (at 5) at the front end thereof; and

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a hydraulically operated crane (see column 2, lines 47-51) having a center post (9a) and a boom (21), the center post supported to extend upwardly from a central location on the trailer platform, the central location centrally located both longitudinally and laterally, the boom extendable outwardly from the center post (arm 21 moves longitudinally as to telescope with respect to housing 18; see the top of column 2), the center post being substantially equidistant between the wheels.

McIntosh et al has attachment (49) at a free end of the boom for connecting a lifting line, as recited in claim 27.

Claims 17, 19, 27 and 32, as best understood, are rejected under 35 U.S.C. § 102(b) as being anticipated by Harsch. Harsh discloses a hydraulic crane (see column 8, lines 69-71) which is mounted over the axle on a rectangular platform. The crane can be mounted on a trailer as well as the truck bed shown in the drawings (see column 4, lines 17-20). The hydraulic crane of Harsch includes a longitudinally mounted cylinder (7), as recited in claims 19 and 32.

Claims 11, 17, 19, 27 and 32, as best understood, are rejected under 35 U.S.C. § 103(a) as being unpatentable over Nelson in view of Harsch. Figures 5 and 6 of Nelson show the basic claimed trailer-mounted crane apparatus comprising:

a compact trailer having a frame (260, 260, 268, 268 and other frame members) supported from a ground surface on at least two wheels (270 and 270) having a common axis of rotation, the trailer having a substantially rectangular trailer platform (274) carried by the frame;

a crane arm (292) extendable from a post (276), the post mounted to the trailer at a fixed position to extend upwardly from a central location of the trailer platform, the central location substantially centrally located both longitudinally and laterally, the post mounted to the trailer at a position substantially vertically aligned with the common axis of rotation of the wheels;

- a power unit (312) mounted on the trailer for supplying energy to the crane;
- a control panel carrying controls (352, 406) mounted on the trailer independent of movement of the post; and

an operator seat (370) supported from the trailer independent of movement of the post and arranged to face the control panel.

Nelson varies from the claims by not having the crane hydraulically powered. Harsch shows a similar trailer mounted crane which is hydraulically driven for better control of the crane movements, see columns 2 and 3. It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the trailer crane of Nelson by having it hydraulically powered, for better control of the crane movements, as taught by Harsch. The trailer of Nelson has a hitch attachment (374) at the front of the frame, as recited in claim 17. The hydraulic drive of Harsch includes a longitudinally mounted cylinder (7), as recited in claims 19 and 32.

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Claim 11, as best understood, is rejected under 35 U.S.C. § 103(a) as being unpatentable over Harsch in view of Hallstrom. Harsh discloses a hydraulic crane (see column 8, lines 69-71) which can be mounted on a trailer as well as the truck bed shown in the drawings (see column 4, lines 17-20). The crane apparatus has a vehicle frame supporting a platform for a crane arm (8) extendable from a post (12), with the post being fixedly mounted centrally of the platform over the wheels. It has a power unit (13) mounted forwardly on the trailer for supplying energy to the crane. Harsch discloses a control panel near the base of the boom, see column 8, lines 66-71, but varies from the claims by not having a seat for the operator located in front of the control panel. Hallstrom shows a similar trailer mounted apparatus with a control panel with an operator's seat (132). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the trailer crane of Harsch by providing its control panel with a seat, for the comfort of the operator, as taught by Hallstrom.

Claims 12-14, as best understood, are rejected under 35 U.S.C. § 103(a) as being unpatentable over Harsch in view of Hallstrom, as applied above to claim 11, and further in view of Haverkamp et al. Harsch, as modified, shows the basic claimed trailer crane. It varies from the claims by not suspending a vibratory sheet pile driver. Haverkamp et al shows a vibratory sheet pile drive that is supported by a crane, see column 1, lines 9-19. It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the crane of Harsch by providing it with other crane type working tools, such as a vibratory sheet pile driver, as suggested and rendered obvious by Haverkamp et al. The hydraulic drive of Harsch includes a longitudinally mounted cylinder (7), as recited in claim 13. Hallstrom locates the seat and controls laterally on the trailer and forward of the power unit, as recited in claim 14.

Claims 12, 13, 18, 29 and 33-35, as best understood, are rejected under 35 U.S.C. § 103(a) as being unpatentable over Nelson in view of Harsch, as applied above to claims 11, 17 and 27, and further in view of Haverkamp et al. Nelson, as modified, shows the basic claimed trailer crane. It varies from the claims by not suspending a vibratory sheet pile driver. Haverkamp et al shows a vibratory sheet pile drive that is supported by a crane, see column 1, lines 9-19. It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the crane of Nelson by providing it with other crane type working tools, such as a vibratory sheet pile driver, as suggested and rendered obvious by Haverkamp et al. The hydraulic drive of Harsch includes a longitudinally mounted cylinder (7), as recited in claim 13. Having the controls for the vibratory sheet pile drive located at crane control station, as recited in claim 33, would have been obvious to one of ordinary skill in the art at the time the invention was made by applicant.

Claims 18 and 29, as best understood, are rejected under 35 U.S.C. § 103(a) as being unpatentable over Harsch in view of Haverkamp et al. Harsch shows the basic claimed trailer crane but varies from the claims by not suspending a vibratory sheet pile driver. Haverkamp et al shows a vibratory sheet pile drive that is supported by a crane, see column 1, lines 9-19. It would have been obvious to one of ordinary skill in the art at the time the

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invention was made to modify the crane of Harsch by providing it with other crane type working tools, such as a vibratory sheet pile driver, as suggested and rendered obvious by Haverkamp et al.

Claims 20 and 30-35, as best understood, are rejected under 35 U.S.C. § 103(a) as being unpatentable over Harsch in view of Haverkamp et al, as applied above to claims 18 and 29, and further in view of Hallstrom. Harsch, as modified by Haverkamp et al, shows the basic claimed crane and vibratory sheet pile driver. Harsch has a power unit (13) mounted forwardly on the trailer for supplying energy to the crane and a control panel near the base of the boom, see column 8, lines 66-71, but varies from the claims by not specifying that the control panel has a seat for the operator, and that the seat and the control panel are mounted laterally offset on the trailer. Hallstrom shows a similar pile driving type trailer with a control panel (152) and an operator's seat (132). It would have been obvious to one of ordinary skill in the art at the time the invention was made by applicant to modify the trailer crane of Harsch by providing its control panel with a seat, for the comfort of the operator, and by mounting the control panel and seat offset on the trailer, for a better view of the lifting, both as taught by Hallstrom. Having the crane portion weighing 50% of the weight of the overall of the apparatus, as recited in claim 31, would have been an obvious design expedient, within the level of routine skill in the art at the time the invention was made by applicant.

Claims 21 and 24, as best understood, are rejected under 35 U.S.C. § 103(a) as being unpatentable over McIntosh et al. Having the crane portion weighing 50% of the weight of the overall of the apparatus, as recited in claim 21, and using 16 inch tires for the trailer, as recited in claim 24, would have been obvious design expedients, within the level of routine skill in the art at the time the invention was made by applicant.

Claims 21 and 24, as best understood, are rejected under 35 U.S.C. § 103(a) as being unpatentable over Harsch. Having the crane portion weighing 50% of the weight of the overall of the apparatus, as recited in claim 21, and using 16 inch tires for the trailer, as recited in claim 24, would have been obvious design expedients, within the level of routine skill in the art at the time the invention was made by applicant.

Claims 26 and 28, as best understood, is rejected under 35 U.S.C. § 103(a) as being unpatentable over in view of Harsch. Harsch shows the basic claimed trailer crane, but varies from claim 26 by not having outriggers. Searle shows a similar trailer crane with outriggers (24) at its four corners. It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the crane of Harsch by providing it with outriggers at each corner, for better support during lifting operations, as taught by Searle.

Claims 26 and 28, as best understood, are rejected under 35 U.S.C. § 103(a) as being unpatentable over Nelson in view of Harsch, as applied above to claims 17 and 27, and further in view of Searle. Nelson, as modified, shows the basic claimed trailer crane. It varies from claim 26 by not having outriggers. Searle shows a

similar trailer crane with outriggers (24) at its four corners. It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the crane of Nelson by providing it with outriggers at each corner, for better support during lifting operations, as taught by Searle.

Claims 1-10 would be allowable if rewritten to overcome the rejections under 35 U.S.C. 112. Claims 15 and 16 would be allowable if rewritten in independent form including all the limitations of their base claim and the intervening claims and rewritten to overcome the rejections under 35 U.S.C. 112.

Moyer and Bodine are cited as showing similar trailer cranes. Barker and Baur show similar crane arms with tool cradles.

Applicant's remarks in the amendment filed November 21, 2003 have been fully considered but are deemed moot in view of the above new rejections. The declarations of Darryl S. Burkett and Ted Fist filed January 23, 2004 have also been considered. However both declarations are drawn to the limitations of claim 1, not the other broader independent claims, which are the claims that have been rejected above. Applicant's amendment necessitated the above new grounds of rejection, accordingly, THIS ACTION IS MADE FINAL. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

An inquiry concerning this communication should be directed to Thomas J. Brahan at telephone number (703) 308-2568. The examiner's supervisor, Ms. Eileen Lillis, can be reached at (703) 308-3248. The fax number for all patent applications is (703) 872-9306.

Thomas J. Brahan Primary Examiner

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